



GARY R. HERBERT
Governor

GREG BELL
Lieutenant Governor

State of Utah

DEPARTMENT OF NATURAL RESOURCES

MICHAEL R. STYLER
Executive Director

Division of Oil, Gas and Mining

JOHN R. BAZA
Division Director

Representatives Present During the Inspection:

OGM	Steve Christensen
OGM	Kevin Lundmark
Company	Dave Shaver
Company	Dana Marrelli

Inspection Report

Permit Number:	C0150032
Inspection Type:	PARTIAL
Inspection Date:	Thursday, March 10, 2011
Start Date/Time:	3/10/2011 10:00:00 AM
End Date/Time:	3/10/2011 1:00:00 PM
Last Inspection:	Wednesday, February 23, 2011

Inspector: Steve Christensen

Weather: Winds 0-5 mph, Sunny, 50 degrees F.

InspectionID Report Number: 2677

Accepted by: jhelfric

3/17/2011

Permittee: **GENWAL RESOURCES INC**

Operator: **GENWAL RESOURCES INC**

Site: **CRANDALL CANYON MINE**

Address: **PO BOX 910, EAST CARBON UT 84520-0910**

County: **EMERY**

Permit Type: **PERMANENT COAL PROGRAM**

Permit Status: **ACTIVE**

Current Acreages

6,235.80	Total Permitted
27.15	Total Disturbed
	Phase I
	Phase II
	Phase III

Mineral Ownership

- ☒ Federal
☐ State
☐ County
☐ Fee
☐ Other

Types of Operations

- ☒ Underground
☐ Surface
☐ Loadout
☐ Processing
☐ Reprocessing

Report summary and status for pending enforcement actions, permit conditions, Division Orders, and amendments:

On March 10th, 2010, Division staff members Steve Christensen and Kevin Lundmark conducted a field inspection of the Crandall Canyon Mine facility. The primary focus of the inspection was the mine-water treatment system.

Following the inspection at the Crandall Canyon mine, Dave Shaver (Genwal Resources) took Mr. Christensen and Mr. Lundmark to a prospective iron sludge disposal site. The site is located approximately 1/4 mile north of Highway 31 across from the Huntington Canyon power plant.

Inspector's Signature:

Date

Monday, March 14, 2011

Steve Christensen,

Inspector ID Number: 54

Note: This inspection report was prepared by the Division of Oil, Gas and Mining, which is a part of the Department of Natural Resources. The Division of Oil, Gas and Mining is responsible for the regulation and enforcement of the Oil, Gas and Mining Act. For more information, please contact the Division of Oil, Gas and Mining at (801) 538-5340 • facsimile (801) 359-3940 • TTY (801) 538-7458 • www.ogm.utah.gov



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REVIEW OF PERMIT, PERFORMANCE STANDARDS PERMIT CONDITION REQUIREMENTS

1. Substantiate the elements on this inspection by checking the appropriate performance standard.
 - a. For COMPLETE inspections provide narrative justification for any elements not fully inspected unless element is not appropriate to the site, in which case check Not Applicable.
 - b. For PARTIAL inspections check only the elements evaluated.
2. Document any noncompliance situation by reference the NOV issued at the appropriate performance standard listed below.
3. Reference any narratives written in conjunction with this inspection at the appropriate performance standard listed below.
4. Provide a brief status report for all pending enforcement actions, permit conditions, Divison Orders, and amendments.

	Evaluated	Not Applicable	Comment	Enforcement
1. Permits, Change, Transfer, Renewal, Sale	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Signs and Markers	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Topsoil	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.a Hydrologic Balance: Diversions	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.b Hydrologic Balance: Sediment Ponds and Impoundments	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4.c Hydrologic Balance: Other Sediment Control Measures	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4.d Hydrologic Balance: Water Monitoring	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4.e Hydrologic Balance: Effluent Limitations	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Explosives	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Disposal of Excess Spoil, Fills, Benches	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Coal Mine Waste, Refuse Piles, Impoundments	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8. Noncoal Waste	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9. Protection of Fish, Wildlife and Related Environmental Issues	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10. Slides and Other Damage	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11. Contemporaneous Reclamation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12. Backfilling And Grading	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13. Revegetation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14. Subsidence Control	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
15. Cessation of Operations	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
16.a Roads: Construction, Maintenance, Surfacing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
16.b Roads: Drainage Controls	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
17. Other Transportation Facilities	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
18. Support Facilities, Utility Installations	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
19. AVS Check	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
20. Air Quality Permit	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
21. Bonding and Insurance	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
22. Other	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

4.b Hydrologic Balance: Sediment Ponds and Impoundments

The primary sediment pond was snow covered on this day.

Following the inspection at the Crandall Canyon mine, Daver Shaver (Genwal Resources) took Mr. Christensen and Mr. Lundmark to a prospective iron sludge disposal site. The site is located approximately 1/4 mile north of Highway 31 across from the Huntington Canyon power plant. The company will propose the construction of at least two shallow evaporation ponds for the purpose of storing and ultimately burying the material on-site. The company is in the process of collecting the requisite baseline data (soils, archaeology, vegetation etc.) for permitting the site under the existing Crandall Canyon Mining and Reclamation Plan (MRP). Based upon the work to date, the company is anticipating the submitting the amendment to the Division within the next month or two. Based on the preliminary work thus far, Mr. Shaver indicated that it would be approximately 4-6 months before the evaporation ponds were permitted, constructed and operational.

The site is approximately 10-12 acres. Upon inspection of the site, several other industrial land-uses were observed in the areas adjacent to the proposed site. A natural gas pumping station and waste-rock site were noted during the field inspection. Mr. Shaver indicated that the site has been previously disturbed by "chaining".

4.c Hydrologic Balance: Other Sediment Control Measures

Operator is wiring a Programmable Logistics Controller (PLC) to automate alarms, flow meters, sensors, etc. Wiring is expected to be completed week of March 17. Three flow meters are to be added: freshwater to flocculant make-down unit, flocculant neat, and coagulant.

Clean water for chemical preparation is no longer being shipped to the site. Operator is using an irrigation pump to fill water tanks from treatment pond outlet. Tanks require filling every 3 days.

Flocculant dosage rate reported as 2.5 ppm (approx). Rate calculated by Operator based on 0.5% flocculant concentration in make down unit, being pumped by a 1 gpm - 60 hz pump operated at 30 hz (for 0.5 gpm). Coagulant dosage rate still approx. 38 ppm based on change in level in tote over time.

Scamp contractors were on-site cleaning the treatment pond. Per Scamp personnel, pond cleanout has been ongoing for at least 2 weeks Mon - Fri. Typically, 2 X large vac trucks and 3 X small vac trucks are filled and transported to Wildcat Loadout each day.

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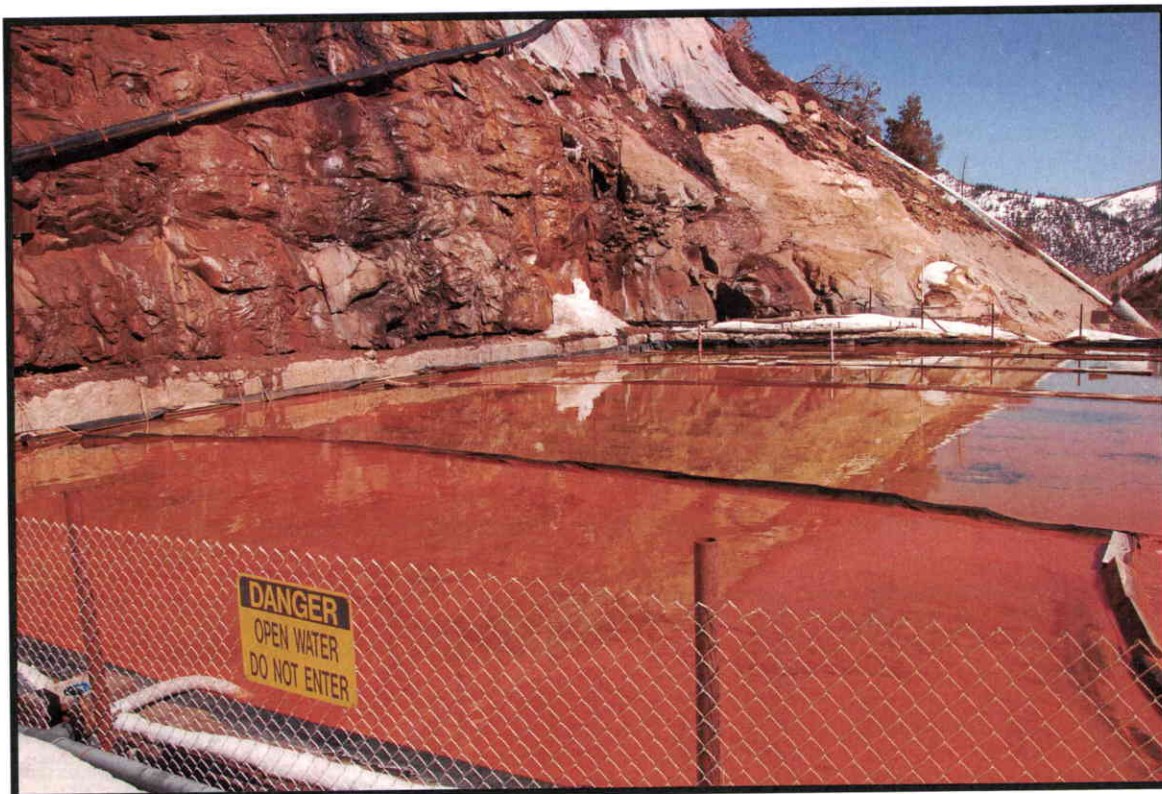
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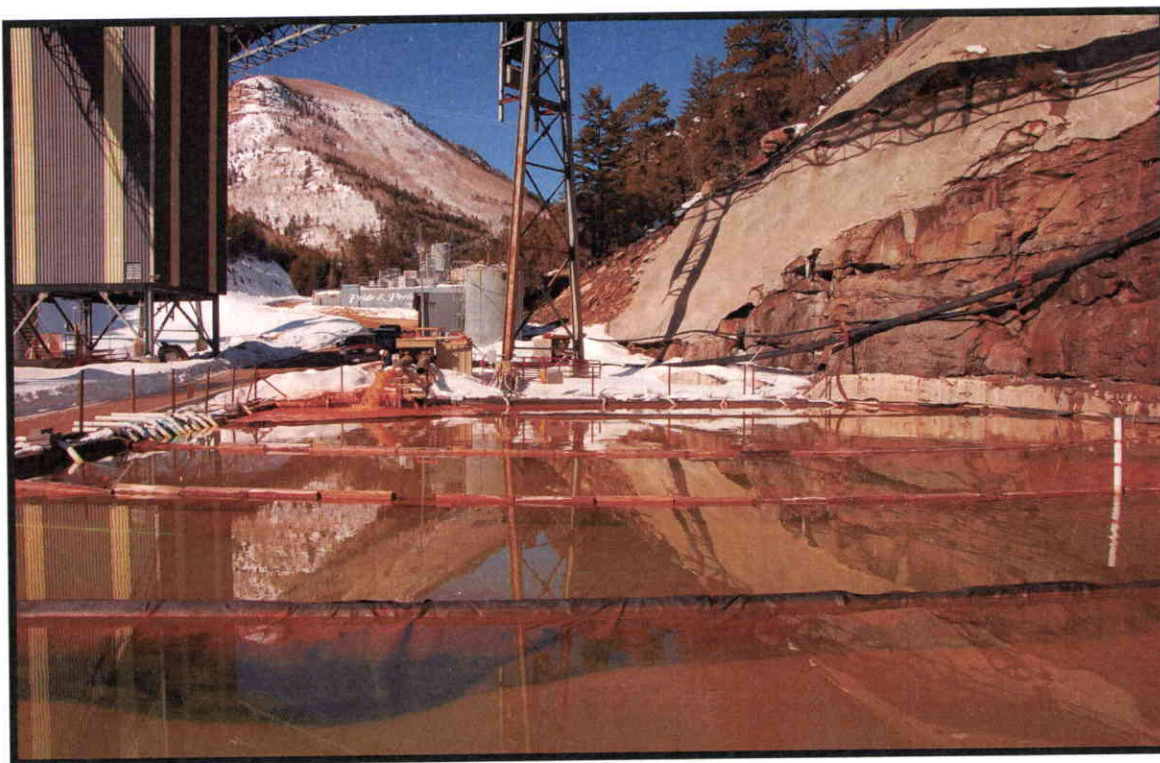
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4.d Hydrologic Balance: Water Monitoring

Division personnel collected samples at Pre-002 and 002 outfall. Sample Pre-002 to be analyzed for sulfate and total iron. Sample at outfall 002 to be analyzed for total aluminum and total iron.



Mine-Water Treatment System- Looking East.



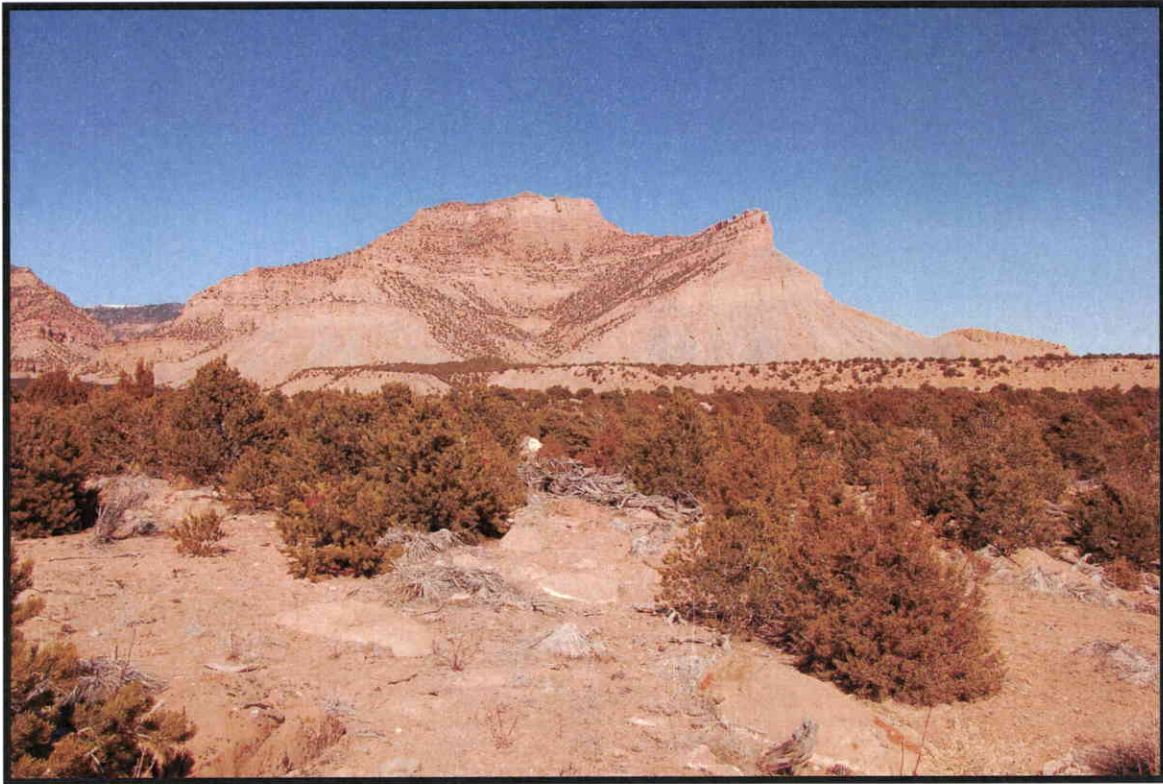
Mine-Water Treatment System- Looking West.



Highwall Area- Directly Adjacent to North Side of Mine



Mine Water Treatment System Outfall and Highwall Seep Discharge



Proposed Iron Sludge Disposal Area – Looking North



Proposed Iron Sludge Disposal Area – Looking South East